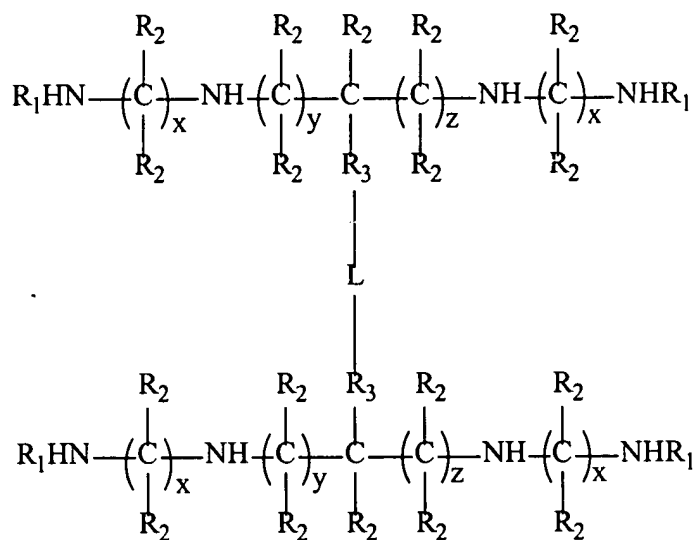


AMENDMENT

In the Claims

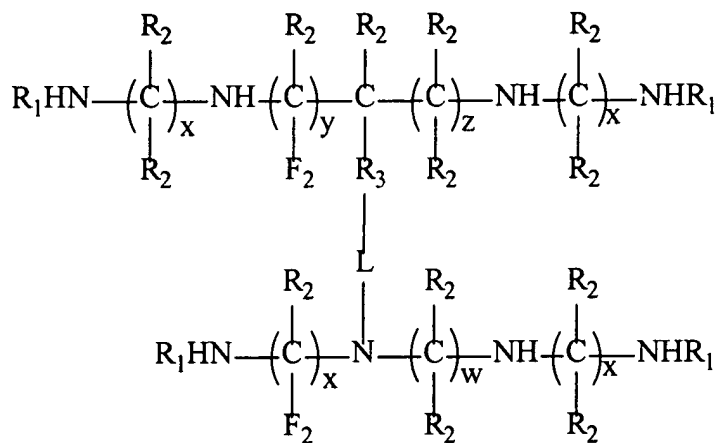
Please cancel claims 1-23 and 27-31 and amend the remaining claims as follows:

32. A synthetic derivative of a polyamine comprising structure 1:



where R_1 is H, methyl, ethyl or propyl, R_2 is H, methyl, ethyl or propyl, x is greater than 2 and less than 5 ($2 < x < 5$), and the sum of $y + x$ is greater than 2 and less than or equal to 6 ($2 \leq y + x \leq 6$), R_3 is an alkyl, keto, ether, thioether, phosphono or sulfonyl group; and L is a linker as defined in claim 24.

36. A synthetic derivative of a polyamine comprising structure 3:



where R_1 is H, methyl, ethyl or propyl, R_2 is H, methyl, ethyl or propyl, x is greater than 2 and less than 5 ($2 < x < 5$), w is greater than 2 and less than 8 ($2 < w < 8$), R_3 is an alkyl, keto, ether, thioether, phosphono or sulfonyl group; the sum of $y + x$ is greater than or equal to 6 ($2 \leq y + x \leq 6$), and L is a linker as defined in claim 24.

39. The synthetic derivative of claim 38, wherein the chemical linker is a α,ω -diamine cross-linker.

41. The synthetic derivative of claim 38, wherein R_1 is H, x is 3 or 4, y is 3 or 4, and $x + y$ is greater than 5 and less than 9.